

INFORMATION PAPER

PURPOSE: To inform on Air National Guard Civil Engineering & Services capabilities to respond to a weapons of mass destruction incident.

1.0 The Air National Guard (ANG) Civil Engineering (CE) and Services (SVCS) functions has many limited capabilities to support and augment federal, state, local, and on-installation first responders during a domestic Weapons of Mass Destruction (WMD) incident with personnel, expertise, and equipment embedded at each unit. As a combat support function of ANG Flying Group/Wings, Civil Engineering and Services are integral functions of the whole Support Group that each Group/Wing has at each installation. The other functions that magnify the capabilities of the CE and SVCS functions to respond to a domestic WMD incident are Transportation, Medical, Supply, Communications, Security Forces, Logistics, and Operations. These functions are required to make the CE and SVCS functions fully capable in rapidly supporting the first responder at a domestic WMD incident.

1.1 The level of expertise available for military support during a domestic WMD incident is a byproduct of the combat readiness training and equipment used to give our combat forces the ability to survive and operate in a WMD environment in wartime against "military grade" WMD agents and devices developed under symmetrical rules of engagement scenario, and not with asymmetrical terrorist threats or attacks using any kind of industrial chemicals, military grade or non-military grade biological or chemical agents, high explosives device or carrier, or radioactive/radiation dispersal device. The training and equipment is not fully compatible with the threats envisioned by terroristic or gorilla methods that could be deployed domestically against non-military personnel or targets at U.S. military installations or any overseas installations.

1.2 There are 95 locations where CE and SVCS units are located throughout the United States and their territories. See attached map for the locations of units and the major cities or metropolitan areas each unit is a part of those communities.

1.2.1 ANG CE has expertise in 6 main areas of disaster management and response. Those areas are (1) Nuclear, Biological, and Chemical (NBC) operations, management and training; (2) Disaster communications, command & control, and information (C₃I) operations; (3) Emergency engineering and expedient beddown operations; (4) Resource protection; (5) EOD operations and management; (6) Firefighting and HAZMAT operations and management.

1.2.2 ANG CE is responsible for NBC detection, monitoring, avoidance, decontamination protocol, operations, and training for all ANG personnel. ANG CE has specialized NBC teams embedded in each unit to include NBC Reconnaissance and detection teams, gross area, equipment, personal and spot decontamination teams. ANG CE has expertise in managing and operating a Contamination Control Area (CCA) which is a staging area for removing and controlling contamination by donning and doffing personal protective equipment when going from toxic hot zone to a toxic free area (TFA). ANG CE has expertise in emergency engineering in facility & utility damage assessment, heavy equipment operations, expedient facility and utility repair teams. ANG CE has expertise in planning, expedient beddown operations of temporary billeting, personal hygiene facilities, messing facilities, mass care facilities, and medical facilities. ANG CE has expertise in design and construction of resource protection structures, potable water production, power generation, area lighting, and other expedient requirements. ANG CE has 10 DOD trained Explosive Ordnance Disposal teams throughout the US trained in all aspects of WMD explosive or dispersal devices. ANG CE firefighters are trained with the capability to perform HAZMAT Operations and Incident Command System (ICS) level tasks. All of these specialized teams

are integral to the wartime tasks of the US Air Force and are inspected and evaluated to show Ability To Survive and Operate (ATSO) in a NBC environment.

1.2.3 ANG SVCS has expertise in two main areas of disaster management and response. Those areas include (1) expedient food service and lodging operations; (2) Mortuary Affairs operations to include registration, identification, preparations, and mass grave plotting and management. Each unit has an operational Mobile Kitchen Trailer (MKT) for food preparations and service for up to 250 persons per meal per day.

2.0 Civil Engineering Units Capabilities and Equipment:

2.1 All 89 ANG Flying Units have a Civil Engineering Squadron consisting of various Base Emergency Engineering Forces (Prime BEEF) teams. Each Prime BEEF team unique Air Force specialties for performing wartime and peacetime disaster tasks:

2.2 Civil Engineering Prime BEEF team are a 55 member UTC tasked unit with 14 augmentees. Each Civil Engineering team has the following wartime specialty teams:

2.2.1 NBC Monitoring and Plotting Team - This team has the ability to monitor and plot chemical plumes and functions as Command and Control Center for NBC recon and decon teams. Using either manual maps or forms or computerized NBC plume programs can quickly communicate the NBC hazard and environment, its persistence, lethality, and symptoms. This team included with a Survival Recovery Command Team can communicate sit-reps, and status reports to via fax, cell phone, radio, email in various formats (i.e. EIS Ecomm, MS Exchange, Ms Outlook, etc) from stationary or mobile command post.

2.2.2 NBC Detection and Reconnaissance Team - Using M 256 Chemical detection Kits and Chemical Agent Monitor units, and M8/M9 Chemical Agent Detection Paper this team can identify and assess concentration of nerve, blood, and blister agents. Also have Radiac Sets for radioactivity detection and concentration of alpha, beta, gamma, x-ray, and neutron radiation.

2.2.3 NBC Contamination Control Team - This team is trained in decontamination and contamination control of protected and non-exposed personnel with contaminated personal protective clothing and equipment from the hot zone. This team is trained in protocols in spreading contamination from hot zone to Toxic Free Areas. Team uses same equipment as NBC Detection and Recon teams.

2.2.4 NBC Decontamination team - Using NBC Decontamination procedures and equipment this team is trained to decon Facilities, pavements, equipment, and personnel. Equipment used is the M17 Lightweight Decontamination Apparatus, wash rack units, High pressure wash units, and manual neutralization using bleach, soap, and other neutralizing chemicals with mops buckets and scrubbers. Quality control of decon uses same equipment as NBC Recon teams to test effectiveness of decon procedures.

2.2.5 Damage Assessment & Recon Team - This team has the capability to assess and recon damaged facilities and report extent of damage, secure utilities, and determine repairs to safe the facility from further damage or continue use of facility. This team has the ability to do expedient repairs to safe facilities and utilities damaged. Each team has personal tools and specialty equipment to perform tasks. The ANG has very limited Repair supplies available which is organic to the unit.

2.2.6 Expedient Facility and Utilities Construction Team - Team has capability to construct expedient and temporary tents, expandable shelters, and troop billeting and dining shelters, using Harvest Bare, Eagle, Falcon, and Phoenix assets. Each team has personal tools and specialty equipment to perform tasks. The ANG has very limited bed-down assets available which is organic to the unit.

2.2.7 Heavy Equipment Repair and Construction Team - This team has the ability to repair and construct roadways, aprons, and building demolition or debris clearing. Heavy equipment operators are trained on most heavy equipment available. The ANG does not have heavy equipment that is organic to the unit and would contract out for equipment or utilize other DoD assets.

2.2.8 Water production team - This team has the training to produce water using a ROWPU unit to produce 600 gallons per hour or 12,000 gallons per day of drinking water. The ANG does not have ROWPU or Erdilators organic to the unit.

2.2.9 Power generation team - This team has the training to produce power using various tactical generators from 30 kW to 750 kW generators and power distribution systems. The ANG has limited number of generators organic to many units.

2.2.10 Engineering design team - This team has the capability to design expedient structures and facilities, layout beddown plans, calculate utility requirements, cost estimates, and develop manpower and materials requirement lists, and critical path assessments of tasks and workloads.

2.2.11 Emergency Airfield Lighting Team - This team has the capability to install an Emergency Airfield Lighting System (EALS) providing expedient airfield lighting for a 10,000 foot by 100-foot expedient runway surface. This piece of equipment is a US Air Force asset and not available as organic equipment to the units.

2.2.12 Mobile Aircraft Arresting System Team - This team has the capability to install a Mobile Aircraft Arresting System (MAAS) providing ability to catch tactical aircraft on any expedient runway surface. This piece of equipment is a US Air Force asset and not available as organic equipment to the units.

2.3 RED HORSE Units have 120 personnel are trained and equipped to provide Heavy Repair or Heavy Construction. These units are broken out by horizontal or vertical construction capabilities but are fully capable of doing the basic Prime BEEF mission. Those capabilities include: (1) roadways, runways, and utilities, (2) Heavy debris removal, (3) heavy expedient construction, (4) And all of the above capabilities of the Basic 55 person Prime BEEF team. All RED HORSE units are self-contained and reliant for several days and have the entire special vehicles and equipment organic to unit and can travel in ground or air mode.

2.4 78 ANG Flying Units have ANG Firefighters either 12 member UTC tasked team with 12 augmentees or a 24 member UTC tasked team.

2.4.1 Each team has capability to provide firefighting operations for aircraft and structural fires. All Units also have HAZMAT training to operations level 2 and ICS level 4; some units are trained to level 3. They are also trained in NBC contamination control and decon operations. All units are equipped to HAZMAT Level C personal protection gear; some units are equipped to the Level A.

2.5 10 Flying Units have Explosive Ordinance Disposal teams with either 4 member UTC tasked team with 2 augmentees or 6 member UTC tasked team.

2.5.1 Each team is trained in all aspects of EOD operations and is capable of handling all WMD devices. They have Level B protective gear but it is not OSHA rated.

3.0 SHORTFALLS AND LIMITING FACTORS IN DOMESTIC WMD INCIDENT:

3.1 PERSONNEL: Only a few personnel are trained, equipped or exercised in the Domestic WMD scenario. Also, only one quarter of each group/wing of 1200 to 1700 persons are full-time employees; AGR, Technician, or State employees. The other three-quarters of the manpower are part-time "drill" or Traditional Guardspersons. The ability to respond with a swift response time say within one to four hours of an incident would be directly proportional to the availability of trained and equipped personnel, whether on or off -work or on-call at each unit at time of incident. The response time capabilities of traditional Guardspersons to reinforce and augment the full-time members would be from 4 to 24 hours based on the time of day and week, whether on-call or re-called, mobilized, deployed from unit or directly to incident. Of the 200 to 300 full-time employees an equipped and trained team of 20 to 30 members would be possible since most full-time employees are also the trainers and most experienced members of the units.

3.2 EQUIPMENT: The units are not sufficiently equipped with mitigation materials, equipment, and Personal Protective Equipment (PPE), i.e. Class A HAZMAT suits and breathing gear and would need to be purchased. Units are not equipped with sufficient vehicles to transport personnel and equipment to the incident site to accomplish this mission. Also, there are very limited resources at the units to bed-down expedient billeting, latrines, or messing facilities. Most of the equipment and expedient facilities are for training use and not fully operational. Most operational assets are U.S. Air Force/Army owned assets and pre-positioned and/or centrally stored or maintained by the US Air Force and not an organic part of many US Air Force or Air Guard units. The Air Guard would have to rely on DoD, National Guard or State for supplying sufficient assets to meet those tasks; or develop legislation, policy, directives, and funding that would allow NGB to have sufficient domestic/home-station assets available to respond to an incident at each unit and in turn use same equipment to support civil authorities.

3.3 TRAINING: There is a requirement for training of all response teams in HAZMAT at the Operations, Technician, and Incident Command Level for those teams needed in the hot zone. Also training would need to be developed to train each team in their respective tasks as required to support the incident commander and responders. Due to the limited man-days available to train "Drill" Guardspersons, the full-time AGRs, Technicians and state employees would need to be trained as train-the-trainers and be fully qualified to carry out the mission as well.

3.4 FUNDING: There is no current funding for the equipment, training, vehicles, and man-days required to equip and train the ANG units with capability to respond to a domestic WMD incident on or off an ANG/AF installation and be in compliance with NFPA, OSHA, and EPA HAZMAT regulations. Also additional NBC Equipment and supplies, and organic equipment should be purchased to give the ANG the full capability to train and exercise to meet this domestic threat during peacetime and wartime and in the end support the national, state, and local first responders.

(Maj Zanca, NGB-ARO-M, 22 June 99, DSN 327-9333, bdz, a:/)

ANG CIVIL ENGINEER UNIT LOCATIONS

